

**Positions Available**

**UNIVERSITY OF FLORIDA  
Department of Materials  
Science and Engineering**

Four Tenure-Track Faculty Positions are available for qualified individuals with expertise in one or more of the following areas of materials science and engineering:

- A. Theory and practice in the application of electron-optical instruments for materials characterization (TEM, etc.);
- B. Preparation, fabrication and characterization of composite materials;
- C. Processing of bulk crystals and thin films of semiconductors; ceramic, polymer and/or metallic thin films for electronics; electrically and optically active point defects in semiconductors; optical and nonlinear optical materials; reliability and packaging.

A doctoral degree in materials science and engineering or a related discipline is required for consideration. Candidates will be expected to develop graduate and undergraduate courses, as well as initiate and sustain sponsored research, in their area of expertise. Positions may be offered at the level of assistant, associate or full professor, depending on the qualifications of the individual candidates.

The Department of Materials Science and Engineering at the University of Florida currently has 23 faculty, 160 undergraduate and 110 graduate students, with substantial and sustained research funding and academic programs in ceramics, composites, electronic materials, metals, and polymers.

The deadlines for submission of these applications are **December 1, 1989, January 1, 1990, February 1, 1990, and March 31, 1990.**

Please send a cover letter specifying interest area (A, B, or C) together with curriculum vitae and three letters of recommendation to:

Dr. Rolf E. Hummel  
Chairman of the Search Committee  
Department of Materials  
Science and Engineering  
University of Florida  
Gainesville, FL 32611-2066

*The University of Florida is an Equal Opportunity/  
Affirmative Action Employer.*

**FACULTY POSITION**

**Department of Metallurgical and Materials Engineering  
California Polytechnic State University  
San Luis Obispo, California**

The Metallurgical and Materials Engineering Department at Cal Poly seeks applicants for a tenure-track faculty position. PhD in materials engineering or related field required. Engineer's degree (professional degree beyond the Master's) or MS in engineering plus current relevant industrial experience, plus registration as a professional engineer and significant professional publications may be acceptable as a substitute for the doctorate. Rank and salary will be commensurate with qualifications and experience. For additional information and an application, send resume to:

Dr. Robert Heidersbach  
Head, Metallurgical and Materials Engineering  
California Polytechnic State University  
San Luis Obispo, California 93407

Screening of applicants will start **February 1, 1990**, and will continue until the position is filled.

*Cal Poly is subject to all laws governing Affirmative Action and Equal Opportunity Employment, including but not limited to Ex. Order 11246, Title IX of the Education Amendment Act and the Rehabilitation Act of 1973. All qualified persons, especially women and minorities are encouraged to apply. Cal Poly employs only individuals lawfully authorized to work in the United States.*

**SCIENTISTS/ENGINEERS  
MICROSTRUCTURAL CHARACTERIZATION**

Universal Energy Systems, Inc. (UES), a high technology R&D firm, has openings for the following personnel for a forthcoming U.S. Air Force program:

**LEAD SCIENTIST/PRINCIPAL INVESTIGATOR — ANALYTICAL ELECTRON MICROSCOPY (AEM):** Lead a group of scientists/technicians dedicated to in-depth microstructural characterization of various materials including metals, ceramics, polymers, electronic materials, metal-matrix composites, and ceramic-matrix compos-

ites. Must have a strong interest and background in AEM techniques and willing to interact effectively with a number of materials scientists to identify and perform areas of AEM research.

A PhD degree in an appropriate discipline (e.g., materials science, physics) with 5-10 years of relevant experience are required.

**SCIENTIST/ENGINEER — TRANSMISSION ELECTRON MICROSCOPY:** Supervise and coordinate a state-of-the-art electron optical facility. Obtain and analyze transmission electron microscopy data which includes electron diffraction, quantitative energy dispersive x-ray analysis, and

TEM images of defect structures and phases under appropriate diffraction conditions. Extensive experience in specimen preparation techniques is required.

An appropriate BS/MS degree with 5-15 years of applicable experience is required.

**SCIENTIST/ENGINEER — ELECTRON PROBE MICROANALYSIS:** Capable of independently generating quantitative chemical data on microconstituents in various materials listed above using quantitative electron probe microanalysis. Should be well versed in the operation and maintenance of electron probe microscopes.

with 5-15 years of applicable experience are required.

As team members you will have the opportunity to use and continually up-grade a state-of-the-art facility and to be involved in exciting materials research projects which are connected with emerging Air Force needs.

An appropriate educational background

Please submit your resume to Ms. Judy McKinley, Personnel, Universal Energy Systems, Inc., 4401 Dayton-Xenia Road, Dayton, OH 45432-1984.

*Affirmative Action Employer M/F/H/V.*

**Advertising Contact**

Mary E. Kaufold  
MRS BULLETIN  
Materials Research Society  
9800 McKnight Road  
Pittsburgh, PA 15237  
(412) 367-3036  
Fax: (412) 367-4373

Positions Available

**AKZO Chemicals Inc.**

**Research Manager**

Akzo Chemicals Inc., a world leader in the specialty chemicals market, has an exciting opportunity for an experienced research professional at our laboratories in Dobbs Ferry, NY.

We have an immediate opportunity for a Research Manager - Engineered Materials. This position offers the challenge and excitement of a start-up program in a corporate research environment, and will report directly to the President of Akzo Corporate Research America, Inc.

The successful candidate will have outstanding scientific and technological skills in both polymeric and ceramic materials for thin film, fiber and bulk applications. Experience in the formation and ongoing management of a material science and engineering oriented group is required.

Key responsibilities will include formulation and leading of an innovative program on new product concepts, coordination of major, long-term research projects at selected top universities. Additionally, acquisition and management of contract research projects for various Akzo Divisions. A proven, recent background in industrial innovation is essential.

Excellent compensation and benefits are provided. For immediate consideration, please forward your resume including salary history in confidence to: **Human Resources**, Akzo Chemicals Inc., Livingstone Avenue, Dobbs Ferry, NY 10522.

An Equal Opportunity Employer. M/F



*Akzo is one of the 15 largest multinational chemical companies with more than 300 operations in more than 50 countries.*

*Our product range includes chemical products, fibers, coatings and healthcare products. Our Research Laboratories are located 20 miles north of NYC on a beautiful campus-like setting in Dobbs Ferry, NY.*

**NIPPON SHEET GLASS PROFESSORSHIP IN MATERIALS SCIENCE**

The UCLA School of Engineering and Applied Science is conducting a national search for an appointment to the Nippon Sheet Glass Professorial Chair in the Department of Materials Science and Engineering. The newly established chair will be dedicated to the areas of Glass and Ceramic Science. The person appointed to this professorship will be a distinguished scholar who has performed outstanding research and teaching in the sciences and technologies important to the glass and ceramics fields. The research focus of the incumbent can be in any facet of glass and ceramic science. Preference, however, will be given to a leader in the general area of innovative and advanced glass and ceramics.

Rank and salary will be commensurate with experience and qualifications. Nominations or applications with a complete resume, and the names and addresses of five references, should be sent to Prof. M.A. El-Sayed, Chair, Search Committee for the NSG Chair in Glass and Ceramic Science, Department of Chemistry, 3048 Young Hall, UCLA, Los Angeles, CA 90024.

Closing date **December 1, 1989**

*UCLA is an Equal Opportunity Affirmative Action Employer.*

**FACULTY POSITION IN MATERIALS SCIENCE  
Columbia University**

The Metallurgy and Materials Science Division of the Henry Krumb School of Mines at Columbia University announces the availability of a faculty position in the field of electronic materials. The appointment may be made at any level, commensurate with the candidate's experience. Appointment as assistant or associate professor will be tenure track. Appointment as a full professor will be considered only for a candidate with an exceptional record of accomplishment. Applicants should have a doctorate in materials or solid state science as well as research experience in fields related to electronic materials. Interested persons should send a complete resume, including the names and addresses of at least three persons who could supply letters of reference, to: Prof. Arthur S. Nowick, Chairman, Search Committee, 1144 Mudd Building, Columbia University, New York, NY 10027. Phone: (212) 854-2921. Applications will be received until the position is filled.

*Columbia University is an equal opportunity affirmative action employer and welcomes applications from qualified minorities and women.*

**MATERIALS SCIENCE AND ENGINEERING  
Washington State University**

Academic year, tenure-track faculty position available for August 1990 at the assistant professor level. PhD in materials science or a closely related academic area is required. Special consideration will be given to candidates with background and experience in one or more of the areas of: electronic materials, ceramic materials, kinetics, processing and physical properties of materials. Duties include developing and conducting externally funded research, teaching graduate and undergraduate courses, and supervising and advising graduate and undergraduate students. The department offers BS, MS and PhD degrees. Letters of application, resumes, and names of four references should be sent to: Chair, Search Committee (MSE), Department of Mechanical and Materials Engineering, Washington State University, Pullman, WA 99164-2920. The closing date is **December 15, 1989** or until the position is filled.

*WSU is an EO/AA educator and employer. Protected group members are encouraged to apply.*

**SOLID-STATE CHEMIST  
Oregon State University**

The Department of Chemistry invites applications for a tenure-track faculty position at the assistant professor level in solid-state chemistry; well-qualified applicants will be considered for appointment at the associate professor level. Duties will include teaching courses in both the department's undergraduate and graduate programs. We seek an individual with expertise in any area of solid-state chemistry who will develop a strong research program to complement an already vigorous and rapidly expanding Materials Center Group. Applications from minorities or women are strongly encouraged. Candidates should submit a concise description of research plans, a curriculum vitae, and three letters of recommendation to:

Carroll W. DeKock, Chair  
Department of Chemistry  
Gilbert 153  
Oregon State University  
Corvallis, Oregon 97331-4003.

Closing date is **December 15, 1989** or until position is filled.

**Positions Available**

**FACULTY RESEARCH POSITIONS**

**University of Nebraska-Lincoln  
Center for Materials  
Research & Analysis**

Applications and nominations are invited for two faculty positions to be associated with the Center for Materials Research and Analysis, effective Fall 1990. The Center is funded by a new State Research Initiative which is expected to grow to \$20 million per year in three years. The Center is an interdisciplinary effort which includes physicists, chemists, and electrical, materials, and chemical engineers.

The positions can be at any level from assistant to full or distinguished professor; each is a regular tenure-track or tenure position with an appointment in one of the participating departments. The general areas of research are materials for information and communication technologies, molecular design of advanced materials, and industrial materials research and analysis. Specific research areas of interest include deliberately-structured materials; thin films, disorder and phase transitions in novel microstructures; particle-solid interactions; and new superconducting, magnetic semiconducting or ceramic materials. Experimental areas of interest include analytical electron microscopy, x-ray and neutron diffraction, crystallography, synthesis of polymeric and other new materials, surface analysis, and others. Substantial setup funds are available and excellent opportunities exist for collaborative research with ongoing programs. Requires teaching at the undergraduate and graduate levels and the development of a vigorous and productive research program.

Send curriculum vitae, list of publications, statement of research interests and plans, and the names and addresses of three references to:

Prof. D.J. Sellmyer  
Center for Materials Research &  
Analysis  
University of Nebraska-Lincoln  
Lincoln, Nebraska 68588-0111  
(402) 472-2770

The selection process will begin December 1, 1989 and continue until offers have been made and accepted. Women and minority candidates are especially encouraged to apply.

*UNL is an Affirmative Action/Equal Opportunity Employer.*

**POSTDOCTORAL POSITIONS  
Center for Interfacial Engineering  
University of Minnesota**

Several postdoctoral positions are available immediately at the Center for Interfacial Engineering of the University of Minnesota. A PhD in physics, chemistry, or engineering is required. Research projects (and Principal Investigators) include: (1) Thin film synthesis and *in situ* characterization by means of CVD, MBE, molecular beam scattering, mass spectrometry, TSD, AES, UPS and XPS spectroscopies, RHEED and UHV-compatible STM (Profs. A. Franciosi and W. Gladfelter). (2) Polymerization of microemulsions to form porous membranes. Familiarity with organic polymerization synthesis methods and physical characterization desirable. (Profs. T. Davis and F. Evans). (3) Research projects on the physics and chemistry of interfaces by means of Scanning Tunneling and Atomic Force Microscopes (Profs. F. Evans, W. Gerberich, W. Gladfelter, A. Franciosi, M. Tirrell, and H. White). Qualified applicants should send their curriculum vitae, list of publications and personal references to the appropriate Principal Investigators at: Center for Interfacial Engineering, University of Minnesota, Shepherd Laboratories, 100 Union Street S.E., Minneapolis, MN 55455.

*The University of Minnesota is an equal opportunity educator and employer and specifically invites and encourages applications from women and minorities.*

**CONDENSED MATTER PHYSICS  
University of Minnesota**

The School of Physics and Astronomy at the University of Minnesota invites applications for a faculty position in Experimental Condensed Matter Physics at the tenured or tenured-track level. A successful applicant will be expected to teach effectively at both the undergraduate and graduate levels, and to conduct a vigorous and significant experimental research program. Applications consisting of curriculum vitae, list of publications, summary of research interests and names of at least three references should be sent to: Marvin L. Marshak, Head, School of Physics and Astronomy, University of Minnesota, 116 Church St. SE, Minneapolis, MN 55455. The closing date for applications is **January 31, 1990**.

*The University of Minnesota is an equal opportunity educator and employer and specifically invites and encourages applications from women and minorities.*

**ASSISTANT PROFESSOR  
Polymer Materials Science**

The Department of Materials Science and Engineering at the University of Pennsylvania anticipates filling a tenure track assistant professorship in polymer materials science. Consideration will be given to candidates in all areas of research on the structural, chemical, and physical properties of polymers. Candidates should send a current curriculum vitae and the names of three references to Prof. Gregory Farrington, Department of Materials Science and Engineering, University of Pennsylvania, 3231 Walnut Street, Philadelphia, PA 19104-6272.

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**FACULTY POSITION  
Materials Science  
Inorganic Thin-Film Materials**

The Department of Materials Science and Engineering at the University of Pennsylvania anticipates filling a tenure-track assistant professorship. Consideration will be given to candidates interested in research on the structural, chemical, and physical properties of inorganic thin films, surfaces and interfaces. Candidates should send a current curriculum vitae and the names of three references to Prof. Takeshi Egami, Department of Materials Science and Engineering, University of Pennsylvania, 3231 Walnut Street, Philadelphia, PA 19104-6272.

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**UNIVERSITY OF CALIFORNIA**

A number of temporary positions (research engineering, postdoctoral scholars, lecturers) may be available in the following areas: materials science, ceramics, composite materials, metallurgy. PhD or equivalent experience. Send resume to B. Dunn, Chairman, Materials Science and Engineering Department, 6531 Boelter Hall, University of California, Los Angeles, CA 90024-1595.

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